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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/477,298	01/04/2000	CHRISTOPHER E. PEARCE	062891.0297	9049
7590 06/17/2005			EXAMINER	
BAKER & BOTTS LLP 2001 ROSS AVENUE			BLOUNT, STEVEN	
DALLAS, TX			ART UNIT	PAPER NUMBER
			2661	

DATE MAILED: 06/17/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

		Ax			
	Application No.	Applicant(s)			
	09/477,298	PEARCE ET AL.			
Office Action Summary	Examiner	Art Unit			
	Steven Blount	2661			
The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with the	correspondence address			
A SHORTENED STATUTORY PERIOD FOR REPL' THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period volume to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be till y within the statutory minimum of thirty (30) day will apply and will expire SIX (6) MONTHS from , cause the application to become ABANDONE	mely filed ys will be considered timely. In the mailing date of this communication. ED (35 U.S.C. § 133).			
Status		,			
1) Responsive to communication(s) filed on 23 M	l <u>arch 2005</u> .				
2a)☐ This action is <b>FINAL</b> . 2b)⊠ This	☐ This action is <b>FINAL</b> . 2b) ☐ This action is non-final.				
closed in accordance with the practice under E	Ex parte Quayle, 1935 C.D. 11, 4	53 O.G. 213.			
Disposition of Claims					
4) ☐ Claim(s) <u>See Continuation Sheet</u> is/are pendin 4a) Of the above claim(s) is/are withdraw 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) <u>1, 4 - 9, 11, 14, 16 - 19, 21 - 22, 26 - 19</u> 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/o	wn from consideration. 29, 31, 34 - 38, 40 - 43, 46 - 58 i	s/are rejected.			
Application Papers					
9) The specification is objected to by the Examine 10) The drawing(s) filed on is/are: a) acc Applicant may not request that any objection to the Replacement drawing sheet(s) including the correct 11) The oath or declaration is objected to by the Ex	epted or b) objected to by the drawing(s) be held in abeyance. Se ion is required if the drawing(s) is ob	e 37 CFR 1.85(a). ojected to. See 37 CFR 1.121(d).			
Priority under 35 U.S.C. § 119					
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:  1. Certified copies of the priority document: 2. Certified copies of the priority document: 3. Copies of the certified copies of the priority application from the International Bureau * See the attached detailed Office action for a list	s have been received. s have been received in Applicat rity documents have been receiv u (PCT Rule 17.2(a)).	ion No ed in this National Stage			
Attachment(s)	»□···-				
1) X Notice of References Cited (PTO-892) 2) Notice of Draftsperson's Patent Drawing Review (PTO-948) 3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date	4)  Interview Summary Paper No(s)/Mail D 5)  Notice of Informal F 6)  Other:				

Continuation of Disposition of Claims: Claims pending in the application are 1, 4 - 9, 11, 14, 16 - 19, 21 - 22, 26 - 29, 31, 34 - 38, 40 - 43, 46 - 58.

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### **DETAILED ACTION**

## Continued Examination Under 37 CFR 1.114

A. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/23/2005 has been entered.

# Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1, 4 7, 9, 11, 14, 16 19, 21, 22, 26 29, 31, 34 38, and 40, 42 43, and 46 54 are rejected under 35 U.S.C. 103(a) as being obvious over U.S. patent 6,259,701 to Shur et al in view of U.S. patent 6,678,279 to Meredith et al.

With regard to claim 1, Shur et al teach a method of establishing a multicast communications session comprising sending multicast media to a group address (col 2 line 57; note also the multicast group address in col 4 lines 33 - 40, and the multicast/unicast servers 120 and 121 in figure 1) and communicating the media to a unicast device to enable a multicast communications session. It is noted that the implementation of the MUS (see col 1, line 55) is the equivalent of generating a

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multicast intermediary. Further, it is stated in column 1, lines 33+ that it is known in the art that unicast endpoints cannot access multicast sessions. In column 2, lines 2+, it is stated that multicast packets received on the multicast address are address translated and sent to a unicast address. One of ordinary skill in the art would find it obvious in view of the above that the unicast device is at least initially determined to be incapable of receiving multicast media streaming after a failed attempt, and would provide a service for this as is discussed in this rejection.

Shur et al do not however teach:

- 1) That the members at the receiving ends to be telephony devices per se, although they do teach computer terminals 110, etc. in figure 1.
- 2) Sorting the multicast streaming from the plurality of mulitcast telephony devices 103, 104, etc. into individual streams based on the telephony devices that sent them (the examiner notes that the act of "translat(ing) the Multicast address of packets received from the joined group to the Unicast address of the joining client" (col 4, lines 39+) is very close to "sorting" the multicast streaming, as is defined by applicant on pages 25 26 of the specification).

With respect to 1), The substitution of telephony devices for computer terminals in this example is an exchange of well known equivalents in view of the well developed state of the art of carrying voice over Internet telephony and the fact that many computers now allow for the capability of plugging in microphones (in conjunction with their speakers) to allow for conversation. Further, the examiner notes that in applicants invention (see fig 1, members 42 and 44), telephones and computers are both applied.

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The examiner notes that in col 4, lines 23+, the use of a "Visual conference tool" is discussed.

With respect to 2), Meredith teaches sorting the multicast data and the unicast data in a packet switch buffering system which includes sorters 108. See especially col 2 lines 63+. Also, the act of converting the data packets to a format the line card interface units can use (see col 3 lines 43+ and col 4 lines 55+) can be considered to be an act of sorting.

It would have been obvious to one of ordinary skill in the art at the time of the invention to have sorted the multicast media streaming from the plurality of telephony devices of Shur with their own special IP addresses, in light of the teachings of Meredith et al, in order to optimize the process of sending multicasting to the unicast devices.

With regard to claim 4, since it is a "conference", Shur et al's teaching of sending multicast media to the intermediary must work in reverse, such that unicast must be able to be sent to multicast.

With regard to claim 5, associating the first logical port of the intermediary with a unicast device and modifying source address received in the received media to specify a second logical port of the intermediary associated with the multicast group address is taught in figure 1, wherein the member 120 is interfaced with members 113 and 102, and note also the address translation described in col 3 lines 33+, col 4 lines 38+, col 5 lines 9+, the mention of the unicast address on the MUS, and the discussion of UDP sockets in col 7 lines 64+ and also col 8 lines 5+.

With regard to claim 6, association of the unicast device with the intermediary

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comprising use of a UDP logical port is taught in col 7 lines 64+.

With regard to claim 7, modifying source and port information: see col 8 lines 5+ and note that this is well known.

With regard to claim 9, two multicast devices 103/104 are shown in figure 1.

With regard to the following claims, note the following, in addition to the preceding rejections:

Cl 11: see above, including plurality of terminals 103, 104 (fig 1), as noted above, unicast member 113, multicast member 102, mus member 120 providing unicast to multicast communication; Cl 14:see above, and note the MUS receives information from 113 and provides it to 102; Cl 16: the MUS is a logical device coupled to the network which uses software to operate members such as 204 in figure 2 and also member 206 in figure 2. It is noted that the use of the MUS discussed in col 1, lines 55+ is provided in response to the fact that the unicast device cannot receive multicast media streaming.

CI 17: The abstract, line 3, states that IP is used on both multicast and unicast networks. CI 18: RTP for multicast streaming is taught in col 6, line 51; CI 19: multiple terminals are shown in figure 1 suggesting a conference, and also, a "Conference Visual Tool" is taught in col 4, line 24; CI 21: note the rejection of claim 1, and further note the plurality of terminals 111, 103, and 104, and note that there are two MUS devices (120 and 121); CI 22: both MUS devices can receive unicast information and communicate it to the multicast group address as noted above; note also that the use of the MUS discussed in col 1, lines 55+ is provided in response to the fact that the unicast device cannot receive multicast media streaming. CI 26: see the rejection of claim 16

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above; Cl 27: see line 3 of the abstract where IP is discussed; Cl 28: See col 6 line 50 where RTP is discussed; Cl 29: a Visual Conference Tool is mentioned in col 4, line 24; Cl 30: as discussed with respect to claim 20, placing the unicast devices on hold is inherent to the process steps such as 506 shown in figure 5; Cl 31: see the rejection of claim 1 above and, as noted above, the operation of the MUS's 201 is carried out through stored software (this applies to the rejection of claims 34 - 39 which follow): note also that the use of the MUS discussed in col 1, lines 55+ is provided in response to the fact that the unicast device cannot receive multicast media streaming. Cl 34: see the rejection of claim 31, and note that receiving unicast media and transmitting it to the multicast group address is taught in Shur et al as described with respect to claim 4: Cl 35: see the rejection of claim 5 above, and note the fact that the functions of member 201 in figure 2 are carried out using software as noted above; CI 36: UDP is taught in col 4 last line and col 5, and IP is taught in the abstract, lines 3+; Cl 37: changing information in the packet is taught in col 8 lines 5+; Cl 38: a Visual Conference Tool is taught in col 4, lines 24+; Cl 39: see the rejections above, including the use of software in the MUS, and note also figure 4, steps 407+.

Cl 40: see the rejection of claim 1 above and note the plurality of multicast devices 111, 103, 104, etc., and further note that member 120 (and its constituent component 206) is essentially a "call manager" that establishes a communication session for member 102; Cl 42: see the rejection of the claims noted above which discuss figure 4 and its relation to putting one of the media stations (in this case, members 103, 104, etc.) on hold; Cl 43: see the rejection of claim 1 above and note

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member 120 receives media from multicast network 102 as shown in figure 1, and communicates it to members 111 also as shown, to enable a unicast communication device to participate in a communication with a multicast communication device; note also that the use of the MUS discussed in col 1, lines 55+ is provided in response to the fact that the unicast device cannot receive multicast media streaming. Cl 46: see the interface between members 113/120 and 120/103 in figure 1 and also see the discussion of the relevant ports in col 7 lines 67+ and further note the rejection of claim 1 above, especially the pertinent portions mentioned concerning address translation: col 3 lines 33+, col 4 lines 38+, col 5 lines 9+; Cl 47: the MUS communicates the information to the unicast members 113, etc. as shown in figure 1; Cl 48: UDP ports are discussed in col 7, lines 63+; Cl 49: modification of the packets (and the headers, where it is well known that the addresses are located there) is taught, as mentioned previously, in col 8, lines 5+.

With regard to claims 50 to 54, see the address translation mentioned in col 3 lines 43+, col 4 lines 38+, and col 5 lines 9+.

3. Claim 41 is rejected under 35 U.S.C. 103(a) as being obvious over U.S. patent 6,259,701 to Shur et al in view of U.S. patent 6,678,279 to Meredith et al as applied above to claims 1, 4 – 7, 9, 11, 14, 16 – 19, 21, 22, 26 – 29, 31, 34 – 38, and 40, 42 – 43, and 46 - 54, and further in view of U.S. patent 5,963,547 to O'Neil et al.

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With regard to this claim, Shur et al/Meredith et al teach the invention as described above, but do not teach summing the multicast information. This is taught in column 4, lines 5+ of O'Neil et al. It would have been obvious to one of ordinary skill in the art at the time of the invention to have summed the multicast information of Shur et al/Meredith et al, in light of the teachings of O'Neil et al, in order to allow the individuals to participate in the phone conference.

4. Claims 55 - 58 are rejected under 35 U.S.C. 103(a) as being obvious over U.S. patent 6,259,701 to Shur et al in view of U.S. patent 6,678,279 to Meredith et al as applied above to claims 1, 4 - 7, 9, 11, 14, 16 - 19, 21, 22, 26 - 29, 31, 34 - 38, and <math>40, 42 - 43, and 46 - 54, and further in view of U.S. patent 6,020,916 to Gerszberg et al.

Shur et al/Meredith et al teach the invention as described above, but do not teach receiving the multicast media directed to the unicast telephony device when the unicast telephony device is placed on hold. This is taught in Gerszberg et al. See col 9 line 35 and col 10 line 50. It would have been obvious to one of ordinary skill in the art at the time of the invention to have provided Shur et al/Meredith et al with a means to place the unicast device on hold, in light of the teachings of Gerszberg et al in order that customers using the unicast terminal may have a means to listen to music while waiting to be connected.

### **Response to Arguments**

5. Applicant's arguments filed 3/23/2005 have been rendered moot in view of the new grounds of rejection.

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Of the prior art cited, the examiner would like to additionally note that USPN 6,567,851 to Kobayashi teaches the applicants process, though from the perspective of a user of a unicast device attempting to reach plural multicast capable devices. See col 4 lines 45+ and figure 2.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Steven Blount whose telephone number is 571 - 272 - 3071. The examiner can normally be reached on M-F 9:00 - 5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Chau Nguyen, can be reached on 571 – 272 - 3126. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Ajit Patel
Primary Examiner

SB (B) 6/5/05